Product Evaluation

The following product has been evaluated for compliance with the wind loads specified in the International Residential Code (IRC) and the International Building Code (IBC).

This product evaluation is not an endorsement of this product or a recommendation that this product be used. The Texas Department of Insurance has not authorized the use of any information contained in the product evaluation for advertising, or other commercial or promotional purpose.

This product evaluation is intended for use by those individuals who are following the design wind load criteria in Chapter 3 of the IRC and Section 1609 of the IBC. The design loads determined for the building or structure shall not exceed the design load rating specified for the products shown in the limitations section of this product evaluation. This product evaluation does not relieve a Texas licensed engineer of his responsibilities as outlined in the Texas Insurance Code, the Texas Administrative Code, and the Texas Engineering Practice Act.

For more information, contact TDI Engineering Services Program at (800) 248-6032.

Evaluation ID: RC-531

Effective Date: March 1, 2017
Re-evaluation Date: March 2021

Product Name: Varitile Romana, Varitile Classic, Varitile Bond 7, Varitile Shake, Varitile Gallo, Varitile Mistral, and Varitile Viksen Stone Coated Steel Panels

Manufacturer: Varitile, Inc.
6 Denny Road, Suite 200
Wilmington, DE 19809
(541) 948-3887

General Description:
Varitile Romana: Preformed, stone coated steel panels with minimum thickness of 25-gauge. The panel has dimensions of 45.47" by 16.34". The exposure is 42.91" x 14.57"

Varitile Classic: Preformed, stone coated steel panels with minimum thickness of 26-gauge. The panel has dimensions of 52.36" by 16.34" high. The exposure is 49.80" x 14.57".

Varitile Bond 7: Preformed, stone coated steel panels with minimum thickness of 26-gauge. The panel has dimensions of 52.36" by 16.34" high. The exposure is 50" x 14.57".

Varitile Mistral: Preformed, stone coated steel panels with minimum thickness of 26-gauge. The panel has dimensions of 51.38" by 16.34". The exposure is 48.82" x 14.57".

Varitile Shake: Preformed, stone coated steel panels with minimum thickness of 26-gauge. The panel has dimensions of 52.36" by 16.34". The exposure is 49.80" x 14.57".

Varitile Gallo: Preformed, stone coated steel panels with minimum thickness of 26-gauge. The panel has dimensions of 51.77" by 16.46". The exposure is 49.61" x 14.57".

Varitile Viksen: Preformed, stone coated steel panels with minimum thickness of 26-gauge. The panel has dimensions of 52.17" by 16.14". The exposure is 49.61" x 14.57".

Limitations:
Roof Framing: The metal roofing panels must be installed over a solidly sheathed roof deck. The roof framing members (rafters or trusses) must be spaced a maximum of 24" on center.

New Roof Framing Attachment: The roof framing must meet or exceed the uplift requirements of the IRC or IBC and must be installed as required for resistance to wind loads.

Design Wind Pressures: The design pressure uplift load resistance must be as specified in each assembly.

Roof Slope: The minimum roof slope is 2:12

Installation:
General Installation Requirements: Manufacturer's installation instructions must be followed, unless otherwise specified by this product evaluation. All edge, corner, and penetration flashing must be installed according to the manufacturer's installation instructions. All fasteners must be corrosion resistance as specified in the IRC, the IBC, and the Texas Revisions.

Assembly No. 1 – Varitile Romana

Design Wind Pressure: -105.0 psf

Deck: The roof deck must be solidly sheathed with minimum 15/32" plywood.

Underlayment: Minimum of one layer of underlayment conforming to ASTM D 226, ASTM D 4869, or ASTM D 1970. The underlayment must be installed in accordance with the IRC or IBC.

Battens: Minimum 1-1/2 x 1-1/2 Southern Yellow Pine or Douglas Fir-Larch battens installed perpendicular to roof framing members. Secured with one No. 10 x 3-1/2" long corrosion resistant Philips, bugle head screw into each roof framing member and one No. 9 x 2-1/2" Star, bugle head screw into sheathing midway between each roof framing member. The battens are spaced a maximum of 14-1/2" o.c.

Panel Attachment: The panels are secured to the battens with six 11-1/2-gauge, 2-1/4" long, UFO Ballistic NailScrew per panel. The fasteners are located into the panel nose through the head lap of the preceding course and into the batten. Adjacent panels are overlapped approximately 3-1/8".

Assembly No. 2 – Varitile Romana

Design Wind Pressure: -172.5 psf

Deck: The roof deck must be solidly sheathed with minimum 15/32" plywood.

Underlayment: Minimum of one layer of underlayment conforming to ASTM D 226, ASTM D 4869, or ASTM D 1970. The underlayment must be installed in accordance with the IRC or IBC.

Battens: Minimum 1-1/2 x 1-1/2 Southern Yellow Pine or Douglas Fir-Larch battens installed perpendicular to roof framing members. Secured with two No. 10 x 3-1/2" long corrosion resistant Philips, bugle head screw into each roof framing member and one No. 9 x 2-1/2" Star, bugle head screw into sheathing midway between each roof framing member. The battens are spaced a maximum of 14-1/2" o.c.

Panel Attachment: The panels are secured to the battens with six 11-1/2-gauge, 2-1/4" long, UFO Ballistic NailScrew per panel. The fasteners are located into the panel nose through the head lap of the preceding course and into the batten. Panels are applied with a 14-1/2" exposure. Adjacent panels are overlapped approximately 3-1/8".

Assembly No. 3 – Varitile Classic

Design Wind Pressure: -86.3 psf

Deck: The roof deck must be solidly sheathed with minimum 15/32" plywood.

Underlayment: Minimum of one layer of underlayment conforming to ASTM D 226, ASTM D 4869, or ASTM D 1970. The underlayment must be installed in accordance with the IRC or IBC.

Battens: Minimum 1-1/2 x 1-1/2 Southern Yellow Pine or Douglas Fir-Larch battens installed perpendicular to roof framing members. Secured with one No. 10 x 3-1/2" long corrosion resistant Philips, bugle head screw into each roof framing member and one No. 9 x 2-1/2" Star, bugle head screw into sheathing midway between each roof framing member. The battens are spaced a maximum of 14-1/2" o.c.

Panel Attachment: The panels are secured to the battens with five 11-1/2-gauge, 2-1/4" long, UFO Ballistic NailScrew per panel. The fasteners are located into the panel nose through the head lap of the preceding course and into the batten. Adjacent panels are overlapped approximately 2-1/2".

Assembly No. 4 – Varitile Classic

Design Wind Pressure: -75.0 psf

Deck: The roof deck must be solidly sheathed with minimum 15/32" plywood.

Underlayment: Minimum of one layer of underlayment conforming to ASTM D 226, ASTM D 4869, or ASTM D 1970. The underlayment must be installed in accordance with the IRC or IBC.

Battens: Minimum 1-1/2 x 1-1/2 Southern Yellow Pine or Douglas Fir-Larch battens installed perpendicular to roof framing members. Secured with two No. 10 x 3-1/2" long corrosion resistant Philips, bugle head screw into each roof framing member and one No. 9 x 2-1/2" Star, bugle head screw into sheathing midway between each roof framing member. The battens are spaced a maximum of 14-1/2" o.c.

Panel Attachment: The panels are secured to the battens with five 11-1/2-gauge, 2-1/4" long, UFO Ballistic NailScrew per panel. The fasteners are located into the panel nose through the head lap of the preceding course and into the batten. Panels are applied with a 14-1/2" exposure. Adjacent panels are overlapped approximately 2-1/2".

Assembly No. 5 – Varitile Bond 7

Design Wind Pressure: -135.0 psf

Deck: The roof deck must be solidly sheathed with minimum 15/32" plywood.

Underlayment: Minimum of one layer of underlayment conforming to ASTM D 226, ASTM D 4869, or ASTM D 1970. The underlayment must be installed in accordance with the IRC or IBC.

Battens: Minimum 1-1/2 x 1-1/2 Southern Yellow Pine or Douglas Fir-Larch battens installed perpendicular to roof framing members. Secured with one No. 10 x 3-1/2" long corrosion resistant Philips, bugle head screw into each roof framing member and one No. 9 x 2-1/2" Star, bugle head screw into sheathing midway between each roof framing member. The battens are spaced a maximum of 14-1/2" o.c.

Panel Attachment: The panels are secured to the battens with five 11-1/2-gauge, 2-1/4" long, UFO Ballistic NailScrew per panel. The fasteners are located into the panel nose through the head lap of the preceding course and into the batten. Adjacent panels are overlapped approximately 2-1/2".

Assembly No. 6 – Varitile Bond 7

Design Wind Pressure: -112.5 psf

Deck: The roof deck must be solidly sheathed with minimum 15/32" plywood.

Underlayment: Minimum of one layer of underlayment conforming to ASTM D 226, ASTM D 4869, or ASTM D 1970. The underlayment must be installed in accordance with the IRC or IBC.

Battens: Minimum 1-1/2 x 1-1/2 Southern Yellow Pine or Douglas Fir-Larch battens installed perpendicular to roof framing members. Secured with two No. 10 x 3-1/2" long corrosion resistant Philips, bugle head screw into each roof framing member and one No. 9 x 2-1/2" Star, bugle head screw into sheathing midway between each roof framing member. The battens are spaced a maximum of 14-1/2" o.c.

Panel Attachment: The panels are secured to the battens with five 11-1/2-gauge, 2-1/4" long, UFO Ballistic NailScrew per panel. The fasteners are located into the panel nose through the head lap of the preceding course and into the batten. Panels are applied with a 14-1/2" exposure. Adjacent panels are overlapped approximately 2-1/2".

Assembly No. 7 – Varitile Shake, Gallo, Mistral, Viksen

Design Wind Pressure: -86.3 psf

Deck: The roof deck must be solidly sheathed with minimum 15/32" plywood.

Underlayment: Minimum of one layer of underlayment conforming to ASTM D 226, ASTM D 4869, or ASTM D 1970. The underlayment must be installed in accordance with the IRC or IBC.

Battens: Minimum 1-1/2 x 1-1/2 Southern Yellow Pine or Douglas Fir-Larch battens installed perpendicular to roof framing members. Secured with one No. 10 x 3-1/2" long corrosion resistant Philips, bugle head screw into each roof framing member and one No. 9 x 2-1/2" Star, bugle head screw into sheathing midway between each roof framing member. The battens are spaced a maximum of 14-1/2" o.c.

Panel Attachment: The panels are secured to the battens with five 11-1/2-gauge, 2-1/4" long, UFO Ballistic NailScrew per panel. The fasteners are located into the panel nose through the head lap of the preceding course and into the batten.

Assembly No. 8 – Varitile Shake, Gallo, Mistral, Viksen

Design Wind Pressure: -142.5 psf

Deck: The roof deck must be solidly sheathed with minimum 15/32" plywood.

Underlayment: Minimum of one layer of underlayment conforming to ASTM D 226, ASTM D 4869, or ASTM D 1970. The underlayment must be installed in accordance with the IRC or IBC.

Battens: Minimum 1-1/2 x 1-1/2 Southern Yellow Pine or Douglas Fir-Larch battens installed perpendicular to roof framing members. Secured with two No. 10 x 3-1/2" long corrosion resistant Philips, bugle head screw into each roof framing member and one No. 9 x 2-1/2" Star, bugle head screw into sheathing midway between each roof framing member. The battens are spaced a maximum of 14-1/2" o.c.

Panel Attachment: The panels are secured to the battens with five 11-1/2-gauge, 2-1/4" long, UFO Ballistic NailScrew per panel. The fasteners are located into the panel nose through the head lap of the preceding course and into the batten. Panels are applied with a 14-1/2" exposure.

Note: Keep the manufacturer's installation instructions on the job site during the installation. Use corrosion resistant fasteners as specified in the IRC, the IBC, and the Texas Revisions.